

In the Matter of the Petition of
SCC Communications Corp.
for Arbitration Pursuant to Section 252(b)
of the Telecommunications Act of 1996
to Establish an Interconnection Agreement
with SBC Communications Inc.

Docket No. _____

I.C.C. DOCKET NO. 000769

Exhibit No. 1-A

Witness

Witness _____
Date 2/5/01 Reporter S

DECEMBER 19, 2000

1 Q. PLEASE STATE YOUR NAME AND BUSINESS ADDRESS FOR THE RECORD.

2 A. My name is Cynthia Clugy. My business address is as follows: SCC Communications
3 Corp., 6285 Lookout Road, Boulder, Colorado 80301-3343.

4 Q. BY WHOM ARE YOU EMPLOYED AND WHAT IS YOUR PRESENT
5 POSITION?

6 A. I am employed by SCC Communications Corp. in the Legal and Government Affairs
7 Department as Manager of Regulatory Compliance. My responsibilities include ensuring
8 SCC's compliance with state and federal regulatory requirements as well as serving as a
9 regulatory and technical witness for SCC in various regulatory proceedings and Section
10 251 negotiations and Section 252 arbitrations throughout the United States. I have not
11 testified before the Illinois Commerce Commission ("ICC").

12 Q. PLEASE DESCRIBE YOUR TELECOMMUNICATIONS EXPERIENCE AND
13 RELEVANT WORK HISTORY.

14 A. Prior to joining SCC, I worked for Southwestern Bell Telephone ("SWBT") for 18 years
15 in various sales, service, and technical support positions. While at SBC, I was
16 responsible for establishing network interconnections for Public Safety Answering Points
17 ("PSAPs") throughout Southeast Texas. In addition I am an active member of the
18 National Emergency Number Association ("NENA"), the non-profit organization that
19 strives to educate, set standards and provide certification programs, legislative
20 representation and technical assistance for implementing and managing 9-1-1 systems in
21 the United States. Currently, I serve on the Non-Traditional Technology Committee,
22 which was established to address the growing number of non-traditional emergency

1 calling methods, e.g., emergency calls placed by Telematics¹ subscribers, with the goal of
2 setting national guidelines for providers of such non-traditional emergency calling
3 methods in the next year.

4 **Q. HAVE YOU EXAMINED THE PETITION AND CORRESPONDING**
5 **MATERIALS FILED BY SCC IN THIS PROCEEDING?**

6 **A.** Yes, I have.

7 **Q. WHAT IS THE PURPOSE OF YOUR TESTIMONY?**

8 **A.** The purpose of my testimony is to provide information to the Illinois Commerce
9 Commission about SCC , its services, and why interconnection is necessary for SCC to
10 compete. In addition, I will address issues identified in SCC's Petition for Arbitration
11 ("Petition"). I will address specific issues as outlined below, and I provide a summary of
12 conclusions reached in my testimony on issues in Exhibit A.

13 **Q. HOW IS YOUR TESTIMONY ORGANIZED?**

14 **A.** I have organized my testimony into the four sections listed below. The issues listed
15 under each section correspond to issues identified in SCC's Petition for Arbitration.

16 **I. BACKGROUND OF SCC AND SCC'S SERVICES**

17 **II. INTERCONNECTION ISSUES**

18 **I.D POINT OF INTERCONNECTION**

19 **II.N RESPONSIBILITIES OF BOTH PARTIES**

20 **II.A TRUNK TERMINATIONS**

21 **II.E NETWORK CONNECTION, FACILITIES AND TRUNKING**

22 **II.C CCSS7 DEFINITION**

¹ Telematics providers provide communications devices to their subscribers that use electronic sensors, wireless communications technologies, and/or location determination technologies to originate a request for emergency

1 II.F PROVISION OF A LINKS

2 IV.A PHYSICAL INTERCONNECTION

3 IV.B NETWORK ARCHITECTURE

4 III. ALI CONNECTIVITY AND DATABASE ISSUES

5 II.H ALI NODE CONNECTIVITY

6 II.J.1 DATABASE MANAGEMENT/ALI STORAGE

7 IV. PRICING AND TARIFFS

8 II.B TARIFFS

9 II.Q BASIS OF COMPENSATION

10 IV.E PRICING OF LEASED FACILITIES

11
12 **I. BACKGROUND OF SCC AND SCC'S SERVICES**

13 **Q. PLEASE PROVIDE BACKGROUND INFORMATION ON SCC.**

14 A. SCC's 9-1-1 SafetyNetSM services are telecommunications services² that facilitate,
15 enhance, and advance the provision of emergency services throughout the United States
16 to end users of wireline, wireless, and telematics (e.g., On Star and Automatic Crash
17 Notification) service providers. Specifically, SCC aggregates and transports traditional
18 and nontraditional emergency call traffic from multiple service providers to appropriate
19 selective routing tandems where such traffic is then transported to the appropriate Public

services.

² In addition to telecommunication services, SCC is the leading provider of 9-1-1 data management services to ILECs, CLECs, integrated communications providers, and wireless carriers in the United States. SCC currently manages the records for approximately 93.5 million wireline telephone subscribers, including 4.1 million CLEC subscribers, and more than 1.6 million wireless subscribers. SCC currently manages the Master Street Address Guides ("MSAGs") for 28 states, processes more than 140,000 service orders per day and processes in excess of 50,000 MSAG requests a year. In addition, SCC has been selected by the Texas Commission on State Emergency Communication as the state's designated 9-1-1 management services provider.

1 Safety Answering Points ("PSAP").^{3/} Aggregating emergency call traffic reduces the
2 number of facilities that must interconnect with the incumbent local exchange carriers'
3 ("ILECs'") selective routing tandems, resulting in a more efficient use of the
4 telecommunications network. Such aggregation also reduces the ILEC's administrative
5 responsibilities: rather than coordinate and interconnect with multiple service providers
6 individually, the ILEC need only coordinate and interconnect with SCC in order to
7 handle the emergency call traffic from multiple service providers. In addition, SCC
8 offers its service provider customers and the interconnecting ILEC assurance that
9 emergency call traffic will be passed to the ILEC's selective routing tandems through
10 redundant, self-healing facilities provided by SCC.⁴
11 Not only will SCC provide efficient and reliable transport of emergency call traffic, but
12 SCC also offers state-of-the-art database management services. These database
13 management services provide enhanced Automatic Number Identification ("ANI") and
14 Automatic Location Identification ("ALI") services to end users of wireline, wireless, and
15 telematics service providers. Such advanced services allow PSAPs to provide quicker
16 and more accurate emergency services, saving innumerable lives.
17 SCC's 9-1-1 SafetyNetSM services include LEC Emergency Call Support service,
18 Wireless Service Provider ("WSP") Emergency Call Support service, and Telematics

³ SCC aggregates and transports 9-1-1 and emergency call traffic from end users of wireline, wireless, and telematics service providers to an ILEC's selective routing tandem and ultimately to the appropriate PSAP. The method of transmission of the 9-1-1 and emergency call traffic to SCC's aggregation point is transparent to the PSAP. All necessary conversion functions and special applications necessary to transport calls and information from wireless and telematics end users calling 9-1-1 or requesting emergency assistance are made within SCC's network. The PSAP that receives a 9-1-1 call from a wireless or telematics end user will be able to process such calls in a manner no different than that currently used for 9-1-1 calls made by existing wireline or wireless end users.

⁴ For more than thirty years, the existing 9-1-1 infrastructure has performed admirably. However, the introduction and proliferation of portable communications technologies such as wireless telephones, Internet Protocol telephony, personal digital assistants, telematics devices in automobiles, and other portable devices places burdens on the existing 9-1-1 infrastructure that severely strains its capability to deliver emergency calls to the appropriate PSAP.

1 Emergency Call Support ("TECS") service. These services are provided over SCC's
2 Emergency Communications Network ("ECN"), which is a fully redundant, physically
3 diverse system designed to accept traditional and non-traditional emergency calls,
4 determine the appropriate PSAP, and forward the calls to the PSAPs via the traditional 9-
5 1-1 infrastructure.

6 LEC Emergency Call Support service allows a LEC to connect all emergency call traffic
7 to redundant SCC switches with the standard interfaces of CCSS7 ISUP, Feature Group
8 D, Enhanced Multi-frequency, and Centralized Automated Message Accounting
9 ("CAMA") 9-1-1 trunks. The ANI associated with the originating caller is utilized by
10 SCC's ECN call management system to route calls to the appropriate 9-1-1 selective
11 routing tandem. The ECN subsequently delivers the voice call with the appropriate ANI
12 to the 9-1-1 selective routing tandem for ultimate call delivery to the appropriate PSAP.
13 Default routing, as designated by the customer and SCC on an individual case basis, is
14 also provided through the ECN.

15 WSP Emergency Call Support service allows a wireless provider to deliver all emergency
16 call traffic to the appropriate 9-1-1 selective routing tandem. This service may be
17 provided on an unbundled basis. The WSP may: (1) utilize only SCC's CRDB to obtain
18 call routing information; or (2) utilize SCC's CRDB and SCC's ECN to obtain call
19 routing information and SCC transport to deliver calls to the appropriate 9-1-1 selective
20 routing tandem.

21 TECS service can accommodate voice only, data only, or voice and data combined.

22 Upon receiving the initial emergency call, the telematics service provider will transfer the
23 call to SCC's ECN. The TECS service will access SCC's CRDB and provide to the

1 telematics provider call routing information for the call, whether it is a voice only call, a
2 data only call, or a voice and data call. The unique call-processing configuration utilized
3 by the telematics service provider will determine the combination of 9-1-1 TECS
4 Services necessary for call delivery to the appropriate PSAP.

5 In addition to the services outlined above, SCC also provides Emergency Warning
6 Evacuation ("EWE") services, and Private Switch ALI ("PS/ALI") directly to residential
7 and business end users.

8 **Q. ARE YOU FAMILIAR WITH SBC'S PROVISION OF EMERGENCY CALLING**
9 **SERVICES?**

10 A. Yes.

11 **Q. HOW SO?**

12 A. While an employee at SWBT, I was directly involved with SWBT's 9-1-1 service
13 provisioning, from both an operational and sales perspective. The bulk of my experience
14 is with SWBT's 9-1-1 service provisioning, but I am familiar with the 9-1-1 operations of
15 SWBT's SBC-owned affiliates.

16 **Q. HOW IS AN EMERGENCY CALL PLACED IN SBC'S TERRITORY?**

17 A. Generally, an end user will place an emergency call from a wireline or wireless telephone
18 or communication device. The emergency call is routed over facilities from his location
19 to the local exchange carrier's Point of Presence ("POP"), and then to the carrier's Point
20 of Interconnection ("POI") with SBC. For the majority of emergency calls, the POI with
21 SBC is at the Selective Routing Tandem. From the Selective Routing Tandem, the voice
22 call and ANI is trunked over SBC facilities to the appropriate PSAP. A data path is
23 triggered when the voice call and ANI are delivered to the PSAP. Specifically, using the

1 ANI, the PSAP bids the ALI host for ALI information corresponding to the caller. The
2 data information is then sent from the ALI node to the PSAP. The appropriate routing of
3 the voice call and ANI, as well as the delivery of the correct ALI information is driven by
4 data loaded into the 9-1-1 selective routing tandems and ALI nodes.

5 **Q. WHY MUST SCC INTERCONNECT ITS NETWORK WITH SBC'S NETWORK**
6 **TO OFFER SERVICES IN SBC'S TERRITORY?**

7 A. SCC needs to interconnect with SBC's Selective Routing Tandems, just as other
8 competitive carriers do to provide their end users with emergency services. Where SBC
9 is the incumbent 9-1-1 services provider, all carriers must interconnect with SBC to
10 deliver emergency calls because SBC owns and controls the Selective Routing Tandems
11 that route emergency calls and the facilities to the PSAPs. Also, the PSAPs are connected
12 to and query the SBC ALI hosts for the data portion of the emergency call. As a result, all
13 providers, including SCC, must interconnect.

14 SCC also requires ALI connectivity between its ALI node and SBC's ALI node(s). Such
15 connectivity is necessary so that PSAPs can access wireless and telematics emergency
16 caller information, including the caller's location, where such information resides in
17 SCC's ALI nodes. SBC provides such ALI connectivity today throughout its territory.
18 Finally, SCC requires database management services from SBC.

19 In sum, without interconnection, SCC will be blocked from entering the market. I
20 discuss SCC's interconnection needs further in Section II below.

1
2 **II. INTERCONNECTION**

3 **Q. ARE YOU FAMILIAR WITH THE FCC'S RULES REGARDING**
4 **INTERCONNECTION?**

5 A. Yes. Although I am not an attorney, my current job duties, which include representing
6 SCC in interconnection negotiations with ILECs, require that I be familiar with the
7 FCC's rules regarding interconnection. I have also become familiar with the FCC's rules
8 regarding interconnection by virtue of my 20- year career in the telecommunications
9 industry.

10 **Q. AT WHAT POINT DOES SCC WISH TO INTERCONNECT WITH SBC'S**
11 **NETWORK?**

12 A. SCC wishes to interconnect with SBC's network at SBC's selective routing tandems.

13 **Q. WHAT IS A SELECTIVE ROUTING TANDEM?**

14 A. A selective routing tandem is a switching office placed upstream from a set of PSAPs
15 which allows the routing of 9-1-1 and emergency calls, based on the caller's telephone
16 number and location, to the appropriate PSAP. Selective routing tandems are also
17 referred to in the industry as selective routers and E9-1-1 tandems.

18 **Q. PLEASE EXPLAIN WHY SCC WISHES TO IDENTIFY THE PARTIES' POINT**
19 **OF INTERCONNECTION AT SBC'S SELECTIVE ROUTING TANDEMS.**

20 A. Unlike typical competitive local exchange carriers, SCC does not provide local exchange
21 dial tone services or toll services; thus, it is unnecessary for SCC to interconnect with
22 every SBC access tandem. SCC is an aggregator and transporter of emergency and 9-1-1
23 calls. In order to route calls for delivery to PSAPs, SCC requires access to SBC's

1 existing dedicated 9-1-1 network. SBC's selective routing tandems are the gateways to
2 that existing infrastructure.

3 **Q. WILL SCC INTERCONNECT WITH SBC'S NETWORK AT MULTIPLE**
4 **POINTS WITHIN A GIVEN LATA?**

5 A. Generally no. In fact, the only situation in which SCC might interconnect with SBC's
6 network at multiple points within a given LATA is if a major metropolitan area is served
7 by more than one SBC selective routing tandem.

8 In order to provide its 9-1-1 SafetyNetSM services, SCC needs to interconnect with SBC's
9 network at only each of SBC's selective routing tandems. SCC does not provide long
10 distance toll or local exchange dial tone services; thus, SCC has no need to interconnect
11 at every SBC local access tandem or in each local calling area. Likewise, SCC does not
12 require trunks between its POP and every access tandem in a given LATA. I suppose
13 that if every SBC access tandem in a given LATA is a selective routing tandem, SCC
14 might require trunking between its POP and each access tandem, and SCC might
15 interconnect at multiple points within that LATA. In my experience, however, it is
16 highly unlikely that each SBC local access tandem is also a selective routing tandem.

17 **Q. IN YOUR OPINION, IS IT UNREASONABLE FOR SBC TO REQUIRE SCC TO**
18 **INTERCONNECT WITH SBC'S NETWORK AT MULTIPLE POINTS WITHIN**
19 **A GIVEN LATA?**

20 A. Yes. By requiring SCC to interconnect at multiple points within a given LATA and to
21 establish trunks between SCC's POP and every SBC access tandem in a given LATA,
22 SBC is attempting to impose a generic CLEC interconnection arrangement on SCC.
23 SCC, however, is not a typical CLEC, for unlike most CLECs, SCC does not provide

1 local exchange dial tone or long distance toll services. SCC aggregates and transports
2 emergency call traffic for delivery to PSAPs, which subserve off of SBC selective routing
3 tandems. Thus, SCC's network architecture requires interconnection at SBC's selective
4 routing tandems, not SBC's access tandems. SCC proposed contract language to reflect
5 this reality, but SBC rejected the proposed language.

6 Moreover, SBC's attempt to dictate where SCC must interconnect with SBC's network is
7 contrary to FCC precedent. Section 251(c)(2) of the Act allows competitive carriers like
8 SCC to interconnect with incumbent networks at any technically feasible point on the
9 ILEC network. The FCC has interpreted this statutory mandate to entitle the requesting
10 carrier, not the ILEC, to select the POI at which to exchange traffic. Indeed, in its First
11 Report and Order in CC Docket No. 96-98 ("Local Competition Order"), the FCC
12 expressly found that "requesting carriers have the right to select points of interconnection
13 at which to exchange traffic with an incumbent LEC." Thus, so long as it is technically
14 feasible to interconnect the requesting carrier's network and the incumbent LEC's
15 network at the POI selected by the requesting carrier, the ILEC must honor that request.
16 Interconnection at SBC's selective routing tandems is technically feasible.

17 **Q. PLEASE EXPLAIN WHY SBC'S SELECTIVE ROUTING TANDEMS ARE**
18 **TECHNICALLY FEASIBLE POINTS FOR INTERCONNECTION?**

19 A. Not only is such interconnection technically feasible, it is commonplace. Indeed, CLECs
20 and wireless carriers routinely interconnect with SBC's selective routing tandems to
21 deliver 9-1-1 traffic to PSAPs. Section 4.2.6 of Appendix 911 to SBC's multi-state
22 interconnection template agreement (attached as Attachment 5 to SCC's Petition for
23 Arbitration) details how CLECs interconnect their networks with SBC's selective routing

1 tandems, and sections 2.1 & 2.2 of SBC's Appendix Wireless Enhanced 911 Services
2 (attached as Attachment 55 to SCC's Petition for Arbitration) details how wireless
3 carriers interconnect their networks with SBC's Selective Routing Tandem. SBC's
4 selective routing tandems are configured to accept such terminating 9-1-1 and emergency
5 traffic.

6 **Q. WHAT FACILITIES ARE REQUIRED TO INTERCONNECT WITH SBC'S**
7 **SELECTIVE ROUTING TANDEMS?**

8 A. In order to interconnect with SBC's selective routing tandems, SCC will require trunking
9 and trunk terminations on SBC's selective routing tandems. SCC will lease transport
10 capacity from other facilities-based carriers between its POP and SBC's selective routing
11 tandems. Actually terminating traffic at SBC's selective routing tandems requires trunk
12 terminations, or ports, in SBC's selective routing tandems. For obvious reasons, trunk
13 terminations in SBC's selective routing tandems are available only from SBC.

14 **Q. WHY ARE TRUNK TERMINATIONS, INCLUDING NECESSARY AND**
15 **ASSOCIATED HARDWARE AND ADMINISTRATIVE SWITCH**
16 **TRANSLATION PROCESSES, NECESSARY FOR SCC TO INTERCONNECT**
17 **WITH SBC'S SELECTIVE ROUTING TANDEMS?**

18 A. Such trunk terminations are not only necessary, they are crucial. SCC intends to
19 aggregate emergency call traffic and transport such traffic for ultimate delivery to PSAPs
20 in SBC's territory. Where SBC is the incumbent 9-1-1 network services provider, PSAPs
21 subtend off of SBC's selective routing tandems. In a very real sense, therefore, SBC's
22 selective routing tandems are exclusive gateways to the PSAPs. In order to deliver
23 emergency calls to PSAPs in SBC's territory, SCC must be able to terminate traffic at

1 these bottleneck facilities. Terminating such traffic requires actual connections to the
2 SBC's selective routing tandems. These connections are accomplished with trunk
3 terminations in the selective routing tandems themselves.

4 **Q. WHAT IS MEANT BY "NECESSARY AND ASSOCIATED HARDWARE AND**
5 **ADMINISTRATIVE SWITCH TRANSLATION PROCESSES?"**

6 A. Every new trunk group that terminates into a switch must be designed, assigned hardware
7 facilities, and translated in the switch's memory. These are considered common
8 hardware and administrative functions of the network operations departments responsible
9 for central office switch maintenance and operations.

10 **Q. DOES SBC PROVIDE SUCH TRUNK TERMINATIONS TODAY?**

11 A. Yes, it does. As I previously testified, CLECs and wireless carriers routinely terminate
12 emergency call traffic to SBC's selective routing tandems. Of course, the only way to
13 terminate such traffic at the designated SBC selective routing tandem is via a trunk
14 termination in that selective routing tandem.

15 Moreover, SBC is required to provide such trunk terminations to competing carriers.
16 Section 251(c)(3) of the Act requires SBC to provide local circuit switching on an
17 unbundled basis. In its Third Report and Order in CC Docket No. 96-98 (hereinafter
18 "UNE Remand Order"), the FCC determined that such local circuit switching includes
19 the basic function of connecting lines and trunks on the line-side and trunk-side of the
20 switch. Trunk-side terminations in SBC's selective routing tandems, therefore, are part
21 and parcel to local circuit switching and must be provided to competitive carriers on an
22 unbundled basis.

1 **Q. WHAT IS THE CONSEQUENCE OF SBC'S REFUSAL TO INCLUDE TRUNK**
2 **TERMINATIONS IN THE PARTIES' INTERCONNECTION AGREEMENT?**

3 A. Trunk terminations are crucial to SCC's ability to deliver emergency calls to PSAPs in
4 SBC's territory. Because the only feasible way to reach PSAPs where SBC is the
5 incumbent 9-1-1 network services provider is through SBC's selective routing tandems,
6 as a practical matter, an interconnection agreement that does not grant SCC trunk
7 terminations in SBC's selective routing tandems is virtually meaningless. Indeed, the
8 ability to transport emergency call traffic to SBC's selective routing tandems is, as a
9 practical matter, useless without the ability to terminate such traffic to SBC's selective
10 routing tandems. Given the considerable importance of trunk terminations to SCC's
11 interconnection needs, as well as SBC's legal obligation to provide SCC such trunk
12 terminations, SCC thought it wise and reasonable to specify in the Parties'
13 interconnection agreement that SBC will provide SCC such trunk terminations.

14 **Q. ARE THERE OTHER NECESSARY ELEMENTS OF SCC'S**
15 **INTERCONNECTION WITH SBC?**

16 A. Yes. SCC requires Common Channel Signaling System 7 ("CCSS7") and Centralized
17 Automated Message Accounting ("CAMA") connections with SBC's selective routing
18 tandems to transmit ANI. CCSS7 is SS7 is the standard switch-to-switch
19 interconnection protocol in the industry. CAMA is unique to 911. While SCC does not
20 wish to perpetuate old technology, reality dictates that many existing selective routing
21 tandems accommodate only CAMA-type trunking. Therefore, it is imperative that SCC
22 have the ability to interconnect with SBC's selective routing tandems using either CCSS7
23 or CAMA.

III. ALI NODE CONNECTIVITY

Q. WHAT IS ALI, AND WHAT IS AN ALI NODE?

A. ALI stands for automatic location identification, which is a feature of E9-1-1 service that displays the caller's telephone number, the location/address of the telephone, and, in some cases, supplementary emergency services information at the PSAP. An ALI node is a database that stores ALI information. An ALI database may be managed by an incumbent local exchange carrier or a third-party ALI database provider, like SCC.

Q. WHAT IS ALI NODE CONNECTIVITY?

A. ALI node connectivity is a critical technical requirement for non-call path-associated-signaling ("NCAS") delivery of wireless emergency calls. In the NCAS scenario, emergency caller data such as the caller's location and the mobile directory, or call-back, number does not accompany the voice call. Rather, such information is created and maintained by the wireless ALI host provider. In many cases, the wireless ALI host provider is SCC. Where SBC is the incumbent 9-1-1 network services provider, a PSAP receiving a voice wireless emergency call will rely on SBC's ALI node for the emergency caller data that corresponds to the voice call. Such data, however, resides not in SBC's ALI node, but in the ALI node of the wireless ALI host provider. Thus, in order for the PSAP to obtain this critical emergency caller data, it must either be dynamically "pushed" from the wireless ALI host provider's ALI node to SBC's ALI node, or "pulled" from the wireless ALI host provider's ALI node by SBC's ALI node. The "push" method of ALI node connectivity is known as "dynamic ALI update." The "pull" form of ALI node connectivity is known as "ALI steering" because SBC's ALI

1 node "steers" to the wireless ALI host provider's ALI node to retrieve the emergency
2 caller data.

3 **Q. WHY DOES SCC REQUIRE ALI NODE CONNECTIVITY?**

4 A. SCC's 9-1-1 SafetyNetSM services are designed to accommodate emergency calls that
5 originate on telematics devices, and SCC intends to use its 9-1-1 SafetyNetSM services to
6 aggregate and transport such non-traditional emergency call traffic for delivery to the
7 appropriate PSAP. Telematics devices use wireless call delivery technology and, in
8 effect, an emergency call placed from a telematics device is the functional equivalent of
9 an NCAS wireless emergency call. Thus, like with NCAS wireless emergency calls, ALI
10 node connectivity is required to deliver crucial emergency caller data to the appropriate
11 PSAP when the emergency call originates on a telematics device.

12 **Q. DOES SBC PROVIDE ALI NODE CONNECTIVITY TODAY?**

13 A. Yes, SBC currently provides both dynamic ALI update functionality and ALI steering
14 functionality in its territory. In Texas, where SCC is the state's designated 9-1-1 database
15 management services provider, SBC retrieves wireless emergency caller data from SCC
16 via ALI steering. Moreover, SBC provides ALI steering to wireless carriers under the
17 terms of wireless interconnection agreements. SBC's Appendix – Wireless Enhanced
18 911 Services (attached as Attachment 55 to SCC's Petition for Arbitration) provides for
19 the type of ALI steering functionality that SCC has requested from SBC. SBC also
20 provides ALI node connectivity via dynamic ALI update functionality in its Ameritech
21 region. In fact, as Ameritech's 9-1-1 database management services provider, SCC
22 performs such dynamic ALI updates on Ameritech's behalf.

1 **Q. DOES SCC PREFER ONE METHOD OF ALI NODE CONNECTIVITY OVER**
2 **ANOTHER?**

3 A. While some form of ALI node connectivity is a crucial interconnection element for SCC,
4 whether such ALI node connectivity is effected via ALI steering or dynamic ALI update
5 functionality is largely irrelevant to SCC. Because SCC is indifferent as to the method of
6 ALI node connectivity provided by SBC, and in recognition of the fact that SBC's
7 technical capabilities with respect to ALI node connectivity vary by region, SCC
8 originally requested both ALI steering and dynamic ALI update functionalities from
9 SBC. SBC rejected SCC's request for dynamic ALI update functionality, despite the fact
10 that ALI node connectivity is accomplished by this method in SBC's Ameritech region,
11 citing a company policy prohibiting third-parties from injecting data directly into SBC's
12 ALI nodes. SCC modified and clarified its request to include only ALI steering unless
13 dynamic ALI update functionality was the method used to achieve ALI node connectivity
14 (e.g. Ameritech). Unfortunately, SBC then indicated that it would not commit to
15 providing SCC ALI steering anywhere in SBC's operating regions.

16 **Q. DOES ALI NODE CONNECTIVITY REQUIRE SBC TO STORE BASIC ALI IN**
17 **ITS ALI NODES?**

18 A. If ALI node connectivity is accomplished via dynamic ALI update functionality, SBC
19 must accept and store in its ALI nodes pseudo-ANIs that are "pushed" from SCC's ALI
20 node. A pseudo-ANI ("pANI") is a telephone number used to support routing to wireless
21 emergency calls. A pANI may identify a wireless cell, a cell sector, or PSAP to which a
22 wireless emergency call should be routed. ALI steering does not require that SBC store
23 basic ALI in its ALI nodes.

IV. PRICING & TARIFFS

Q. HAS SCC REQUESTED PRICING INFORMATION FOR THE INTERCONNECTION ELEMENTS AND SERVICES IT HAS REQUESTED?

A. Yes, on several occasions throughout the parties' negotiations.

Q. HAS SBC PROVIDED THE PRICING INFORMATION SCC REQUESTED?

A. No. SBC has not provided any pricing information to SCC other than vague and general references to "applicable tariffs."

Q. HAS SBC IDENTIFIED APPLICABLE TARIFFS FOR THE SERVICES SCC HAS REQUESTED?

A. No. SBC has not identified "applicable tariffs" with any specificity.

Q. WHAT ARE THE INTERCONNECTION ELEMENTS AND SERVICES SCC HAS REQUESTED?

A. In essence, SCC has requested three interconnection elements and services: (1) connectivity to SBC's selective routing tandems; (2) database management – *i.e.* inputting records into SBC's 9-1-1 database management system ("DBMS"); and (3) ALI node connectivity.

Q. WHAT ARE THE PRICING COMPONENTS ASSOCIATED WITH CONNECTIVITY TO SBC's SELECTIVE ROUTING TANDEMS?

A. Two basic components are necessary for SCC to interconnect with SBC's selective routing tandems: (1) transport; and (2) trunk terminations, along with associated hardware and administrative switch translation processes. These components may be offered via tariff or via interconnection agreements with competitive local exchange

1 carriers, and the components may be bundled or priced individually. Also, pricing for
2 these components varies by state. SCC has requested pricing information for these
3 components on several occasions, most recently in its Discovery Request in this
4 proceeding, but to date, SBC has not provided the requested pricing information.

5 **Q. WHAT ARE THE PRICING COMPONENTS ASSOCIATED WITH DATABASE**
6 **MANAGEMENT?**

7 A. In general, database management services include a number of elements: (1) the ability to
8 download subscriber records to SBC's 9-1-1 DBMS; (2) the ability to access the 9-1-1
9 Master Street Address Guide ("MSAG"); (3) validation of subscriber records against the
10 MSAG, which creates ALI records and updates to SBC's selective routing tandems; (4)
11 storage of selective routing data to effect delivery of an emergency call to the appropriate
12 PSAP; and (5) storage of ALI records for delivery to the appropriate PSAP.

13 Traditionally, SBC's tariffs bundle these elements with 9-1-1 network services (*i.e.*
14 transport). In some instances, however, database and network services are tariffed
15 separately. SCC has requested pricing information for database management on several
16 occasions, most recently in its Discovery Request in this proceeding, but to date, SBC has
17 not provided the requested pricing information.

18 **Q. WHAT ARE THE PRICING COMPONENTS ASSOCIATED WITH ALI**
19 **CONNECTIVITY?**

20 A. Three basic components are required for ALI node connectivity: (1) ports on SBC's ALI
21 node(s); (2) translation and maintenance of the ports; and transport between SCC's ALI
22 node and SBC's ALI node(s). SCC has requested pricing information for these

1 components on several occasions, most recently in its Discovery Request in this
2 proceeding, but to date, SBC has not provided the requested pricing information.

3 **Q. DOES SBC'S FAILURE TO IDENTIFY PRICES HINDER SCC'S ABILITY TO**
4 **PROVIDE SERVICES IN SBC'S REGIONS?**

5 A. Yes. As I testified previously, in order to provide its 9-1-1 SafetyNetSM services in
6 SBC's regions, SCC must interconnect its network with SBC's selective routing tandems.
7 However, in order to determine pricing for its 9-1-1 SafetyNetSM services and actually
8 market services in SBC's regions, SCC must incorporate the cost of interconnection into
9 SCC's cost analysis. Until SCC has an accurate picture of its costs in providing its 9-1-1
10 SafetyNetSM services, SCC cannot determine appropriate price levels for those services
11 and, therefore, cannot market such services in SBC's regions. Thus, by withholding
12 pricing information from SCC, SBC effectively prevents SCC from offering its services
13 in SBC's territory.

14 **Q. DOES THIS CONCLUDE YOUR TESTIMONY?**

15 A. Yes.

EXHIBIT A

SUMMARY OF ISSUES

Issue I.D – Point of Interconnection (“POI”): SBC is required to provide interconnection at any technically feasible point. In fact, should SBC want to limit its POIs, SBC must demonstrate that it is not technically feasible for a requesting carrier to interconnect at that point. Thus, SBC should not be permitted to limit its definition to of POI to only those technologies and technical interfaces that have been mutually agreed to.

Issue II.A – Trunk Terminations: SBC is required to provide trunk terminations into its Selective Routing Tandems for the purpose of routing emergency calls. Indeed, emergency calls could not be routed without such trunk terminations. SBC already provides such termination and other part of local circuit switching on a unbundled basis to providers. Thus, SBC should identify trunk terminations in its 9-1-1 Appendix.

Issue II.B – Tariffs: SBC is required to provide pricing for interconnection and unbundled network elements (“UNEs”) that is just, reasonable and nondiscriminatory. SBC is failing to meet its obligation by including only general references to tariffs. SBC should be required to provide pricing in an appendix to the agreement, which is a reasonable format that is typical of many interconnection agreements.

Issue II.E – Network Connection, Facilities, and Trunking: SCC has proposed to lease facilities to interconnect with SBC and to designate the POI at SBC’s Selective Routing Tandems. In addition, SCC seeks to establish diverse facilities upon request for redundancy. SBC should provide SCC interconnection at its Selective Routing Tandems because it already provides such interconnection for other providers. Leased facilities and the ability to request

diverse facilities for redundancy are integral to SCC's service offerings, and they are technically feasible. SBC should be required to provide this network connection, facilities, and trunking.

Issue IV.A – Physical Interconnection: SCC is permitted to interconnect with SBC's network at any technically feasible point under the Act. SCC needs to interconnect with SBC's network at the Selective Routing Tandems in order to fulfill its business plans. SBC's attempts to force SCC to interconnect "in each local calling area" or "at all Tandems in a LATA," should be rejected because they are contrary to the law and SCC's business imperatives.

Issue IV.B – Network Architecture: SCC should not be forced to establish its network architecture as SBC requires under its generic agreement. SBC's proposed language would require SCC to establish trunks between its POP and every SBC local calling area or access tandem in a given area where SCC originates or terminates calls. SCC does not require such interconnection or trunks between its POP and every access tandem in each LATA. SCC is permitted to interconnect at any technically feasible point, and SBC's generic network architecture language should be rejected as inapplicable and contrary to the law.

Issue II.C – CCSS7 Definition: Where it exists in the network, SCC will use CCSS7 for interconnection. Thus, it is important to accurately define CCSS7. SCC's definition is reasonable and consistent with the industry's definition of CCSS7. Although SBC did not reject SCC's definition, SBC did not confirm its acceptance. SCC's definition of CCSS7 should be adopted.

Issue II.F – Provision of A Links: SCC needs A Links to accomplish the CCSS7 connections needed for call delivery. SCC proposed language for A Links; however, SBC did not confirm this language although SBC makes A Links available to other providers. SCC's proposed language for A Links should be adopted.

Issue II.H – ALI Node Connectivity: This issue consists of three parts: (1) whether SBC should be required to provide frame relay connectivity between SCC's ALI node and SBC's ALI node to effect Dynamic ALI Updates or ALI Steering; (2) whether such ALI node connectivity is a wholesale or retail offering; and (3) whether SBC must provide such ALI node connectivity only upon the request of a PSAP wishing to accept wireless and telematics emergency calls. SBC should provide SCC ALI node connectivity to effect ALI Steering or Dynamic ALI Updates. ALI node connectivity is a critical technical requirement for non-call path-associated-signaling ("NCAS") delivery of wireless 9-1-1 calls. Indeed, SBC makes this available in its Wireless 9-1-1 Appendix (see Attachment 55 to SCC's Petition). In Texas, SBC steers to SCC's ALI node to retrieve wireless emergency caller subscriber data. SBC provides Dynamic ALI Updates functionality in its Ameritech region. Given that SBC currently provides ALI node connectivity in its operating territory, SBC's should be required to provide SCC with ALI node connectivity. Moreover, SBC's attempt to condition its obligation to provide SCC ALI node connectivity on wireless carriers' obligation to provide Phase I wireless E911 services to PSAPs is unreasonable, anti-competitive, and should be rejected as contrary to the public interest. SBC must provide ALI connectivity services to SCC not because a PSAP has requested Phase I wireless E911 service, but because SCC is both an agent of wireless carriers and a certified carrier that aggregates and transports wireless and telematics emergency calls.

Issue II.J.1 – Database Management – ALI Storage: If ALI node connectivity is accomplished via Dynamic ALI Update functionality, SBC must accept and store in its ALI nodes pseudo-ANIs that are "pushed" from SCC's ALI node. SBC need not store such information in its ALI nodes if ALI Steering is used. ALI node connectivity is a critical technical requirement for NCAS call delivery. Thus, unless and until SBC agrees to provide

SCC ALI Steering services, it is reasonable and necessary to specify that SBC must store basic ALI in its ALI nodes to effect Dynamic ALI Updates.

Issue II.Q – Basis of Compensation: SCC should not be charged for SBC's services until live traffic is passed, not simply when SBC's services are activated. SBC's attempts to charge SCC for services that are not actively provided should be rejected.

Issue III. – Reciprocal Compensation: SCC should not be subject to reciprocal compensation for the termination of emergency calls into SBC's network. Such calls will pass from SCC's network to SBC's network and terminate at SBC's Selective Routing Tandems for routing to the appropriate PSAP. Thus, these calls are identical to emergency calls terminated by CLECs into SBC's network. SBC typically does not charge CLECs reciprocal compensation for terminating such traffic. SBC's attempt to treat SCC differently is unreasonable, discriminatory, and anti-competitive.

Issue III.E – Pricing of Leased Facilities: The FTA requires that ILECs make interconnection available to CLECs on rates, terms, and conditions that are just, reasonable, and nondiscriminatory. SBC should make available the prices it intends to charge SCC for leased interconnection facilities. To date, SBC has not provided SCC with the rates SBC intends to charge for leased interconnection facilities. A sound business plan is contingent upon relative certainty as to the expenditures that will be made for necessary facilities. SCC's ability to negotiate with SBC, and ultimately provide service in SBC's service areas, will be hindered until SBC produces the rates it proposes to charge for leased interconnection facilities.

Issue II.G – Geographic Area: SCC's proposed language identifies the Parties' interconnection point, *i.e.*, the Selective Routing Tandem. This language should be adopted because it is accurate and reasonable.

Issue II.I – Facilities and Trunking: SCC made no revisions to SBC's provision addressing SBC's obligations when it is the E911 Database Manager. However, because this provision addresses database issues, SCC moved it to the section of Appendix 911 that addresses database issues. Because SCC has not proposed changes to SBC's language, the language should be accepted.

Issue II.J – Database Management: If ALI node connectivity is accomplished via Dynamic ALI Update functionality, SBC must accept and store in its ALI nodes pseudo-ANIs that are "pushed" from SCC's ALI node. SBC need not store such information in its ALI nodes if ALI Steering is used. SBC, however, has refused to commit to provide SCC ALI Steering services. As discussed above, ALI node connectivity is a critical technical requirement for NCAS call delivery. Thus, unless and until SBC agrees to provide SCC ALI Steering services, it is reasonable and necessary to specify that SBC must store basic ALI in its ALI nodes to effect Dynamic ALI Updates.

Issue II.N – Responsibilities of Both Parties: SCC identified specifically the Parties' POI at SBC's Selective Routing Tandems. SBC's original proposed language referenced the Parties' POI generally. SCC's language accurate and reasonable and should be adopted.

Issue IV.D – Joint Facility Growth Planning: SBC should not be permitted to turn down interconnection trunks between the Parties unilaterally. If SBC prematurely turns down interconnection trunks and, as a result, calls are dropped due to insufficient capacity, the results could be life-threatening. SCC has proposed language that does not permit SBC to act unilaterally. SCC's language should be adopted.

Issue IV.F – Bona Fide Request Process: SCC should not be subject to a time-consuming and costly BFR process when requesting equipment or facilities for interconnection.

SBC must make such facilities available upon request in the same manner it makes them available to itself. SCC language deletes the objectionable BFR language, and it should be adopted.

Issue V.A – Testing of E911 Trunks: A simple standard interval for provisioning trunks, such as specifying the number of days, is necessary. SBC's language lacks any degree of certainty as to when SCC will be able to use 9-1-1 trunks provisioned by SBC, and is tied to an unspecified testing time frame. A simple standard interval for provisioning is necessary. SCC's proposed language works towards a mutually agreeable testing period that is in parity with what SBC provides to itself, and should be adopted.